# INTISARI

**Himayati. NIM 3212056. 2022.** *Hubungan lama masa kerja dan lama paparan pestisida terhadap kadar Cholinesterase pada petugas penyemprot di perkebunan kelapa sawit PT. X Jambi.*

Pestisida adalah salah satu hasil teknologi modern dan mempunyai peranan penting dalam meningkatkan kesejahteraan rakyat. Sebagian besar cara penggunaan pestisida oleh petani adalah dengan cara penyemprotan. Saat penyemprotan merupakan keadaan dimana petani sangat mungkin terpapar bahan kimia yang terdapat dalam pestisida yang digunakan. Bahaya yang dapat terjadi saat penyemprotan tersebut dapat mengakibatkan gangguan yang menyebabkan penyakit. Salah satu parameter untuk mengetahui terjadinya keracunan pestisida adalah menurunnya aktivitas enzim *Cholinesterase*. Tujuan penelitian ini untuk mengetahui ada atau tidaknya hubungan antara lama masa kerja dan lama paparan pestisida terhadap kadar *Cholinesteras*e darah petugas penyemprotan di PT. X Jambi. Jenis penelitian ini observasional analitik, untuk pengambilan sampel dilakukan di perkebunan kelapa sawit PT. X Jambi. Pemeriksaan kadar *Cholinesterase* darah diperiksa di pusat rujukan nasional Prodia Jakarta dengan metode Tes fotometri kinetic. Hasil pengukuran kadar Cholinesterase dalam darah dari 43 responden didapatkan hasil dalam batas normal. Uji koreksi pearson product moment menunjukkan bahwa tidak ada hubungan yang signifikan antara lama masa kerja terhadap kadar Cholinesterase dan terdapat hubungan yang signifikan antara lama paparan pestisida terhadap kadar Cholinesterase pada petugas penyemprot di perkebunan kelapa sawit PT. X Jambi .

**Kata kunci :** *Cholinesterase,* petugas penyemprotan, pestisida

# ABSTRACT

**Himayati. NIM 3212056. 2022.** Correlation between length of work and duration of pesticide exposure to Cholinesterase levels in spraying officers at oil palm plantations at PT. X Jambi

Pesticides are one of the results of modern technology and have an important role in improving people's welfare. Most of the ways farmers use pesticides are by spraying. When spraying is a situation where farmers are very likely to be exposed to chemicals contained in the pesticides used. The danger that can occur when spraying is that it can cause interference that causes disease. One of the parameters to determine the occurrence of pesticide poisoning is the decreased activity of the cholinesterase enzyme. The purpose of this study was to determine whether or not there was a relationship between length of work and duration of pesticide exposure to blood cholinesterase levels of spraying officers at PT. X Jambi. This type of research is analytic observational, for sampling carried out in oil palm plantations of PT. X Jambi. Examination of blood cholinesterase levels was checked at the Prodia Jakarta national referral center using the kinetic photometric test method. The results of the measurement of Cholinesterase levels in the blood of 43 respondents were found to be within normal limits. Pearson product moment correction test showed that there was no significant relationship between length of service and cholinesterase levels and there was a significant relationship between duration of pesticide exposure to cholinesterase levels in spraying officers at oil palm plantations of PT. X Jambi.

**Keyword :** cholinesterase, spraying officers, pesticide